

AGREEMENT FOR PROFESSIONAL ENGINEERING SERVICES

between

CITY OF WEST LAFAYETTE, INDIANA

and

GREELEY AND HANSEN LLC

**Article I. PARTIES AND PROJECT**

This AGREEMENT is made effective on the 14 day of June in the year 2016 between the City of West Lafayette, Indiana, hereinafter referred to as CITY, and Greeley and Hansen LLC, an Illinois limited liability company, with its principal office at 100 South Wacker Drive, Chicago, Illinois 60606-4004, and a regional office at 7820 Innovation Boulevard, Suite 150, Indianapolis, Indiana 46278, hereinafter referred to as ENGINEER, for professional engineering services in connection with the Auburn Meadows Lift Station and Force Main Improvements, the PROJECT.

**Article II. ENGINEER'S SERVICES**

ENGINEER shall provide appropriate professional engineering services as required to complete the scope of services as set forth hereinafter, and shall perform such services in conformance with the ordinary standards of care and skill of the engineering profession.

**A. Basic Services**

The scope of the basic services for the PROJECT are set forth in Exhibit A attached hereto and made a part of this AGREEMENT. ENGINEER shall not perform services beyond the scope as defined in Exhibit A without the prior written authorization of CITY.

**B. Additional Services**

ENGINEER may submit proposals for additional professional engineering services in connection with the PROJECT. Each proposal submitted shall detail the: (1) scope of additional services, (2) period of services, and (3) method and amount of compensation.

CITY shall provide written acceptance and authorization to ENGINEER prior to the commencement of work on any proposed additional services. Upon receipt by ENGINEER of written acceptance and authorization by CITY, each proposal for additional services in connection with the PROJECT shall become part of this AGREEMENT and shall be governed by the terms and conditions contained herein.

**C. Period of Services**

ENGINEER agrees that the basic services as described in Exhibit A will be substantially complete in accordance with the following schedule:

<u>Basic Services Milestones</u>	<u>Completion Time Months from Notice to Proceed</u>
Documents for GMAX Proposal	3
Construction Engineering	11

The period of services will begin upon the date of CITY'S written notice to proceed. ENGINEER shall not, however, be responsible for timely completion of basic services as agreed to herein if completion is delayed by the failure of CITY to furnish the services provided for under Article IV., hereof, in a timely manner, or for other reasons beyond the control of the ENGINEER.

ENGINEER further agrees that additional services will be substantially complete within the period specified in each accepted and authorized proposal for additional services, unless reasons for delay in completion are beyond the control of ENGINEER.

If ENGINEER'S basic services or any accepted and authorized additional services are delayed or suspended in whole or in part by the CITY for more than ninety days beyond the scheduled completion date for said basic or additional services for reasons beyond ENGINEER'S control, compensation for the delayed services, as provided in Article III. hereunder, shall be subject to renegotiation upon the written request of ENGINEER. However, such request must be submitted by ENGINEER to the CITY prior to the completion of the delayed services.

### **Article III. ENGINEER'S COMPENSATION**

ENGINEER shall perform professional engineering services as provided in Article II. of this AGREEMENT for which CITY shall compensate ENGINEER as follows:

#### **A. Basic Services**

##### **1. Personnel Services**

ENGINEER shall be compensated for personnel services on the basis of actual annual average hourly rates paid to personnel assigned to the PROJECT for each hour of services rendered times a 3.2 factor to cover overhead and profit. Such rates shall be computed as actual annual base salary, in effect at the time the services are rendered, divided by 1,950 hours. Personnel services rates shall include applicable required overtime premium for covered employees.

##### **2. Subconsultants and Other Professional Associates**

CITY shall pay ENGINEER for the services of subconsultants and other professional associates at their invoiced fees to ENGINEER plus 10 percent.

##### **3. Reimbursable Direct Costs**

CITY shall pay ENGINEER the actual cost of any direct reimbursable expenses incurred in connection with performing the services.



**B. Additional Services**

Unless otherwise provided for in any accepted and authorized proposal for additional services, such services shall be compensated for on the same basis as provided for in Paragraph III. A., above, for basic services.

**C. Total Compensation**

Total compensation to ENGINEER for basic services under this AGREEMENT shall include full reimbursement for personnel services, subconsultants and other professional associates and reimbursable direct costs incurred in performing basic services, as described in Paragraph III. A. It is agreed that the total compensation to ENGINEER for performing basic services will not exceed \$197,000 as set forth in Exhibit B, without prior approval of CITY.

The provisions of this Article III. C. shall also apply to each accepted and authorized proposal for additional services in connection with the PROJECT. However, the term "basic services", as used in this Article III. C., shall mean "additional services" and the terms "Exhibits A" and "Exhibit B" as used in this Article III. C. shall mean "the accepted and authorized proposal for additional services". The estimated compensation for any additional services, and the completion date beyond which these amounts are subject to renegotiation, shall be as specified in each such authorized proposal.

**D. Terminated Services**

If this AGREEMENT is terminated, ENGINEER shall be paid for services performed to the effective date of termination as follows:

1. For personnel services, the hours of services rendered at the established rates, to the effective date of termination times the factors established herein.
2. For services of subconsultants and other professional associates, their invoiced fees to ENGINEER, for services to the effective date of termination plus 10 percent.
3. For reimbursable direct costs, the actual cost of direct reimbursable expenses incurred to the effective date of termination.

**E. Conditions of Payment**

1. Progress payments shall be made in proportion to services rendered and expenses incurred as indicated within this AGREEMENT and shall be due and owing within thirty days of ENGINEER'S submittal of his progress payment invoices.
2. If CITY fails to make payments due ENGINEER within forty-five days of the submittal of any progress payment invoice, ENGINEER may, after giving fifteen days written notice to CITY, suspend services under this AGREEMENT.
3. No deduction shall be made from ENGINEER'S compensation on account of penalty, liquidated damages or other sums withheld from payments to construction contractors.
4. If the PROJECT is delayed, or if ENGINEER'S services for the PROJECT are delayed or suspended for more than ninety days for reasons beyond ENGINEER'S control, ENGINEER may, after giving fifteen days written notice to CITY, request renegotiation of compensation under Article II. C. or may terminate this AGREEMENT.

**Article IV. CITY'S RESPONSIBILITIES**

The CITY shall, as required:

- A. Provide all criteria and full information as to CITY'S requirements for the PROJECT, and furnish copies of all design and construction standards which the CITY will require to be included in the drawings and specifications.
- B. Assist ENGINEER by placing at ENGINEER'S disposal all available information pertinent to the PROJECT including CITY maps and plats, previous reports, drawings, specifications and any other data relative to the design or construction of the PROJECT.
- C. Furnish to ENGINEER property and land use data pertaining to the PROJECT available to the CITY including, but not limited to, property, boundary, easement, right-of-way, topographic and utility surveys; property descriptions; zoning, deed and other land use restrictions; and other related data.

- D. Provide legal, insurance and financial consulting services necessary for the PROJECT, and such accounting and auditing services as the CITY may require.
- E. Furnish permits and approvals from all governmental authorities having jurisdiction over the PROJECT and from others as may be necessary for completion of the PROJECT.
- F. Furnish above record information, property and land use data, and services at CITY'S expense in such manner that ENGINEER may rely upon them in the performance of services under this AGREEMENT.
- G. Furnish any laboratory analyses that may be required in connection with the PROJECT.
- H. Guarantee full and free access to ENGINEER to enter upon all public and private property required for the performance of ENGINEER'S services under this AGREEMENT.
- I. Designate in writing a person to act as CITY'S representative with respect to the services to be performed under this AGREEMENT. Such person shall have complete authority to transmit instructions, receive information, interpret and define CITY'S policies and decisions with respect to materials, equipment, elements and systems pertinent to ENGINEER'S services.
- J. Coordinate, consolidate, reconcile and bring congruence to differing views in the CITY'S organization to form single firm responses stating the CITY'S position on matters requiring resolution during performance of ENGINEER'S services. Examine all studies, reports, sketches, drawings, specifications, proposals and other documents presented by ENGINEER and render in writing decisions pertaining thereto within a reasonable time so as not to delay the services of ENGINEER. Render such decisions in a consolidated form reconciling differing views into an unambiguous single firm response to each matter requiring resolution.



- K. Provide ENGINEER with prompt written notice of any defect or suspected defect in ENGINEER'S performance of any services rendered pursuant to this AGREEMENT or relating to the PROJECT.
- L. In any agreement entered into between the CITY and other contractors for the PROJECT in which such contractors and their subcontractors agree to indemnify, provide insurance coverage to, and/or name as additional insured, the ENGINEER, its subconsultants, professional associates, and each of their officers, principals, partners and employees to the same extent as to the CITY. Furthermore, the CITY will provide ENGINEER with certificates of insurance from each such contractor or subcontractor.
- M. Give prompt written notice to ENGINEER whenever the CITY observes or otherwise becomes aware of any development that affects the scope or timing of ENGINEER'S services, or any defect in the work of construction contractors.
- N. Compensate ENGINEER in accordance with the provisions of Article III.

## **Article V. GENERAL PROVISIONS**

### **A. Ownership of Documents**

All reports, schedules, drawings, specifications and other products of services of ENGINEER for this PROJECT are instruments of service for this PROJECT only and shall remain the property of ENGINEER until the CITY has compensated ENGINEER in full for services rendered pursuant to the AGREEMENT. Upon final payment for each phase of Basic Services and for each separately accepted and authorized proposal for additional services, ownership of the products or instruments of service for said phase or additional services authorized shall be vested in the CITY. ENGINEER, however, may retain record copies of all such instruments of service and may use such for ENGINEER'S exclusive purposes. Reuse of any of the instruments of service of ENGINEER by the CITY on extensions of this PROJECT or any other project shall be at the CITY'S sole risk and the CITY agrees to defend, indemnify and hold harmless ENGINEER from

all claims, damages, and expenses including attorney's fees arising out of reuse of ENGINEER'S instruments of service by the CITY or by others acting through the CITY.

**B. Data on Electronic Media**

Data delivered on electronic media are considered part of the ENGINEER'S instruments of service and, therefore, Article V.A. above applies to documents delivered on electronic media.

The form of ENGINEER'S drawings, specifications, reports, data or other information that may be relied upon are those which 1) are set forth on paper (also known as hard copies) and 2) are designated as final. Files in electronic media format of text, data, graphics, or other types are furnished only for convenience, not reliance by the CITY. Any conclusion or information obtained or derived from such electronic files will be at the CITY's sole risk. If there is a discrepancy between the electronic files and the hard copies, the hard copies govern.

Because files stored in electronic media format can contain irregularities, deteriorate or be modified inadvertently or otherwise without authorization of the ENGINEER, the transmitted electronic files should be examined by the CITY within 60 calendar days of receipt, after which time the CITY shall be deemed to have accepted the files thus transmitted. Any transmittal deficiencies detected within the 60-day acceptance period will be corrected by ENGINEER. Deficiency corrections requested after the acceptance period will be considered "additional services." ENGINEER is not responsible for irregularities, deterioration or modifications occurring or detected after the 60 calendar-day acceptance period.



ENGINEER 1) makes no representations as to the long-term usability or readability of the electronic files and 2) cannot be depended upon to maintain copies of the electronic files after the 60 calendar-day acceptance period.

The documents will be in the software listed below designed for operation on a PC compatible computer under the associated operating system as listed below:

Type of Document	Software	Operating System
Wordprocessed Text	MS Word 2007	Windows
Spreadsheets	MS Excel 2007	Windows
CADD Drawings	AutoCAD 2015	Windows

The ENGINEER makes no warranty as to the compatibility of electronic files beyond those versions. However, the ENGINEER reserves the right to submit documents in versions newer than those shown above.

ENGINEER makes no representations as to the compatibility, usability, or readability of the electronic files resulting from the use of software application packages, operating systems, or computer hardware (e.g. monitors, graphic cards and plotters) differing from those used by ENGINEER and its subconsultants. Also, the use of software application packages, operating systems and computer hardware different from those used by ENGINEER and its subconsultants may introduce errors and irregularities. Such occurrences are not the responsibility of ENGINEER and its subconsultants.

**C. Successors and Assigns**

1. The CITY and ENGINEER each binds himself and his partners, successors, executors, administrators, assigns and legal representatives to the other party to this AGREEMENT and to the partners, successors, executors, administrators, assigns and legal representatives of such other party, in respect to all covenants, agreements and obligations of this AGREEMENT.
2. Neither the CITY nor ENGINEER shall assign or transfer any rights under or interest in this AGREEMENT without the written consent of the other, except to the extent that the effect of this limitation may be restricted by law. Unless specifically stated to the contrary in any written consent to an assignment, no assignment will release or discharge the assignor from any duty or responsibility under this AGREEMENT. Nothing contained in this paragraph shall prevent ENGINEER from employing such independent subconsultants and associates as may be deemed appropriate to assist in the performance of services hereunder.

**D. Changes in Scope and Revisions**

The general category "additional services", referred to in Article II. B. may include services due to changes in the scope of the PROJECT, including, but not limited to, changes in size, complexity, schedule or character of the services and also may include revisions to instruments of service previously approved by the CITY or other revisions due to causes beyond the control of ENGINEER. All changes in scope and revisions shall require the written acceptance and authorization of the CITY prior to commencement of work, as provided in Article II. B.

This AGREEMENT takes into account the professional engineering and architectural signing and sealing requirements that are applicable as of the date of this AGREEMENT. Any changes to those requirements during the performance of the services associated with this AGREEMENT which cause revisions to the scope of the ENGINEER'S services or to the ENGINEER'S instruments of services shall be considered "additional services".

Proposals for services pursuant to changes in scope or revisions shall, upon CITY'S acceptance and authorization, become part of this AGREEMENT and shall be governed by the terms and conditions contained herein.

**E. Extent of AGREEMENT**

This AGREEMENT represents the entire understanding and agreement between the CITY and ENGINEER for professional engineering services pertaining to the PROJECT as described in Article II. and supersedes all prior negotiations, representations or agreements, either written or oral. This AGREEMENT may be amended only by written instrument signed by both the CITY and ENGINEER.

**F. No Waiver**

Failure of the ENGINEER or the CITY to insist upon strict and punctual performance of any terms or conditions of this AGREEMENT shall not be construed to constitute a waiver of, or estoppel against, asserting the rights to require such performance. Neither shall a waiver nor an estoppel in one instance constitute a waiver or an estoppel with respect to a later default, whether similar or dissimilar in nature.

**G. Severability**

If any part of this AGREEMENT is determined by a court to be in conflict with statute or constitution or to be unlawful for any reason, the parties intend that the remaining provisions of this AGREEMENT shall remain in full force and effect unless the stricken provision leaves the remaining AGREEMENT unenforceable.

**H. Governing Law**

This AGREEMENT shall be governed by the laws of the State of Indiana.

**I. Subconsultants**

During the performance of the AGREEMENT, ENGINEER may engage such additional subconsultants or professional associates as may be appropriate for the timely completion of the services or to meet applicable requirements. The engagement of any subconsultants or professional associates shall be subject to the prior approval of the CITY.



**J. Insurance**

ENGINEER shall acquire and maintain:

1. Statutory worker's compensation insurance coverage.
2. Commercial general liability insurance coverage with a limit of \$1,000,000 or more per occurrence and annual aggregate applicable to bodily injury and property damage claims.
3. Professional liability insurance coverage with an annual aggregate limit of at least \$1,000,000.

**K. Site Visits During Construction**

In accordance with the scope of basic services, ENGINEER shall make visits to the site at intervals appropriate to the various stages of construction as ENGINEER deems necessary in order to observe, as an experienced and qualified design professional, the progress and quality of the various aspects of the construction contractors' work. Based on information obtained during such visits and on such observations, ENGINEER shall endeavor to determine if such work, in general, is proceeding in accordance with the construction Contract Documents. ENGINEER shall not be required to make exhaustive or continuous on-site inspections to check the quality or quantity of such work. ENGINEER shall not supervise, direct or have control over construction contractors' work nor shall ENGINEER have authority over or responsibility for construction means, methods, techniques, sequences or procedures or for safety precautions or programs. Accordingly, ENGINEER shall not guarantee the performance of construction contractors and ENGINEER shall not be responsible for the failure of construction contractors to perform the work in accordance with the construction Contract Documents. During such visits and on the basis of on-site observations, ENGINEER shall keep CITY informed of the progress of the work, and shall inform CITY and construction contractors of any observed defects, deficiencies and matters not in compliance with the construction Contract Documents.

The parties hereto agree that the ENGINEER'S authority, duties, obligations and responsibilities arising under this AGREEMENT and its exercise thereof, are in no way intended to result in the ENGINEER being deemed to be an entity having charge of the erection, construction, repairing, alteration, removal or painting of any building, bridge, viaduct or other structure.

**L. ENGINEER'S Estimates of Cost and Standard of Care**

Since ENGINEER has no control over the cost of labor, materials, equipment or services furnished by others, or over contractors' methods of determining prices, or over competitive bidding or market conditions, ENGINEER'S estimates of project and construction costs are to be made on the basis of its experience and qualifications and represent its best judgment as an experienced and qualified professional engineering firm, familiar with the construction industry; but ENGINEER cannot and does not guarantee that proposals, bids or actual project or construction costs will not vary from ENGINEER'S estimates of cost.

Notwithstanding any other provisions in this AGREEMENT to the contrary, nothing herein contained shall be construed as:

1. Constituting a guarantee, warranty or assurance, either express or implied, that the engineering services will yield or accomplish a perfect outcome for the PROJECT; or
2. Obligating the ENGINEER to exercise professional skill and judgment different from that which can be reasonably expected from other engineers under like circumstances; or
3. An assumption by the ENGINEER of liability greater than or differing from those explicit in this AGREEMENT, or
4. An assumption by the ENGINEER of the liabilities of any other party.
5. An assumption by the ENGINEER for the construction means, methods, techniques, procedures, or safety precautions and programs in connection with the Project.

**M. Indemnification**

CITY and ENGINEER each agree to indemnify and hold the other harmless, and their respective officers, employees, agents and subcontractors, from and against liability for all claims, losses, damages and expenses, including reasonable attorneys' fees, to the extent such claims, losses, damages, or expenses are caused by the indemnifying party's negligent acts, errors or omissions. In the event claims, losses, damages or expenses are caused by the joint or concurrent negligence of CITY and ENGINEER, they shall be born by each party in proportion to its negligence. Notwithstanding the above, neither the CITY nor ENGINEER shall have the right of recourse to the other party for any consequential damages incurred due to the fault of the CITY or the ENGINEER, their employees, agents, or subcontractors, irrespective of any forewarning of potential for such damages arising.

In the event litigation is commenced to enforce any term or condition of this agreement, the prevailing party in such litigation shall be entitled to costs of litigation including a reasonable attorney fee.

**N. Termination**

This AGREEMENT may be terminated by the CITY without cause on thirty days written notice. If the PROJECT is delayed, or if ENGINEER'S services for the PROJECT are delayed or suspended for more than ninety days for reasons beyond ENGINEER'S control, ENGINEER may request renegotiation of compensation in accordance with the provisions of Articles II. and III. or, after giving fifteen days written notice, terminate this AGREEMENT with cause. In the event of substantial failure to perform in accordance with the terms of this AGREEMENT, the party not at fault may terminate the AGREEMENT with cause on ten days written notice. If this AGREEMENT is terminated, ENGINEER shall be compensated for services performed to the effective date of termination in accordance with the provisions of Article III. of this AGREEMENT. Within sixty days following the date of receipt of the termination notice, and following receipt of compensation for services to date of termination, ENGINEER shall submit to the CITY copies of all reports, drawings, specifications and other products or instruments of service prepared prior to termination.



**O. Remedies**

Except as may be otherwise provided in this AGREEMENT, all claims, counter-claims, disputes and other matters in question between the CITY and ENGINEER arising out of or relating to this AGREEMENT or the breach thereof will be decided by arbitration if the PARTIES mutually agree or in an Indiana court of competent jurisdiction.

**P. Non-Discrimination and Equal Employment**

ENGINEER agrees:

1. That in the hiring of employees for the performance of work under this contract or any Subconsultant hereunder, no ENGINEER, or Subconsultant, nor any person acting on behalf of such ENGINEER or Subconsultant, shall, by reason of race, religion, color, sex, national origin or ancestry, discriminate against any citizen of the State of Indiana who is qualified and available to perform the work to which the employment relates.
2. That no ENGINEER, Subconsultant, nor any person on his behalf shall, in any manner, discriminate against or intimidate any employee hired for the performance of work under this contract on account of race, religion, color, sex, national origin or ancestry.
3. That the CITY may deduct from the amount payable to the ENGINEER a penalty of five dollars (\$5.00) for each person for each calendar day during which such person was found to have been discriminated against or intimidated in violation of the provisions of the contract.
4. If there is found to be a second or any subsequent violation of the terms or conditions of this section, then this contract may be cancelled or terminated by CITY and all money due or to become due hereunder will be forfeited.

**Q. Engaging in activities with Iran**

By signing this Contract, ENGINEER certifies that it is not engaged in investment activities in the county of Iran as set forth in IC 5-22-16.5.

**R. E-Verify**

ENGINEER shall comply with E-Verify Program as follows:

1. Pursuant to IC 22-5-1.7, ENGINEER shall enroll in and verify the work eligibility status of all newly hired employees of ENGINEER through the E-Verify Program ("Program"). ENGINEER is not required to verify the work eligibility status of all newly hired employees through the Program if the Program no longer exists.
2. ENGINEER and its Subconsultants shall not knowingly employ or contract with an unauthorized alien or retain an employee or contract with a person that ENGINEER or its Subconsultants subsequently learns is an unauthorized alien. If ENGINEER violates this Section, the CITY shall require ENGINEER to remedy the violation no later than thirty (30) days after the CITY notifies ENGINEER. If ENGINEER fails to remedy the violation within the thirty (30) day period, the CITY shall terminate the contract for breach of contract. If the CITY terminates the contract, ENGINEER shall, in addition to any other contractual remedies, be liable to the CITY for actual damages. There is a rebuttable presumption that ENGINEER did not knowingly employ an unauthorized alien if ENGINEER verified the work eligibility status of the employee through the Program.

3. If ENGINEER employs or contracts with an unauthorized alien but the CITY determines that terminating the contract would be detrimental to the public interest or public property, the CITY may allow the contract to remain in effect until the CITY procures a new Engineer.
4. ENGINEER shall, prior to performing any work, require each Subconsultant to certify to ENGINEER that the Subconsultant does not knowingly employ or contract with an unauthorized alien and has enrolled in the Program. ENGINEER shall maintain on file a certification from each Subconsultant throughout the duration of the Project. If ENGINEER determines that a Subconsultant is in violation of this Section, ENGINEER may terminate its contract with the Subconsultant for such violation. Such termination may not be considered a breach of contract by ENGINEER or the Subconsultant.
5. By its signature below, ENGINEER swears or affirms that it i) has enrolled and is participating in the E-Verify program, ii) has provided documentation to the CITY that it has enrolled and is participating in the E-Verify program, and iii) does not knowingly employ an unauthorized alien.



**S. Notices**

Any notices required hereunder or by law may be directed to the parties at the following addresses:

**To ENGINEER:**

Ms. Nicole B. Spieles  
Managing Director Midwest  
Greeley and Hansen LLC  
100 South Wacker Drive, Suite 1400  
Chicago, IL 60606-4004

**To CITY:**

Mr. David S. Henderson  
Wastewater Treatment Utility Director  
City of West Lafayette  
500 South River Road  
West Lafayette, IN 47906

All notices shall also be given to:

Mr. Eric H. Burns  
Withered Burns LLP  
8 North Third Street, Suite 401  
P.O. Box 499  
Lafayette, Indiana 47902

All notices shall be deemed to be given when deposited with the United States Postal Service for first class mail delivery.

**Article VI. APPROVAL**

In WITNESS WHEREOF, the parties hereto have caused this AGREEMENT to be executed by their duly authorized officers and partners and is made effective the day and year first above written.

GREELEY AND HANSEN LLC

Nicole B. Spieles

Managing Director Midwest

ATTEST:

Ryan M. Christopher

Associate

CITY OF WEST LAFAYETTE, INDIANA  
BOARD OF PUBLIC WORKS AND SAFETY

Sana G. Booker

President

Bradley L. Cohen

Member

Brooke E. Folkers

Member

Jason D. Huber

Member

Thomas J. Kent

Member

## **EXHIBIT A**

### **AGREEMENT FOR PROFESSIONAL SERVICES**

between

CITY OF WEST LAFAYETTE

and

GREELEY AND HANSEN LLC

### **SCOPE OF ENGINEERING SERVICES FOR AUBURN MEADOWS LIFT STATION AND FORCE MAIN**

Engineer shall provide professional engineering services in connection with the wastewater lift station for the proposed Auburn Meadows subdivision. The lift station will be designed to incorporate the flows tributary to Auburn Meadows, but also with the flexibility to serve flows from Arbor Chase. This would allow the City to eliminate the Arbor Chase Lift Station by extending gravity sewer to the Auburn Meadows Lift Station. The proposed concept is consistent with the City's Collection System Master Plan. It is anticipated that the lift station will be designed and constructed using the Guaranteed Savings Contracting delivery method.

The scope of engineering services includes planning, design, guaranteed maximum price proposal assistance and construction administration for a new submersible lift station, including backup generator and approximately 5,200 feet of force main.

#### **TASK 1.0 GENERAL**

- 1.1 Progress Meetings. Conduct up to three (3) progress meetings with the City to review technical aspects of the project, project cost and schedule for a kick-off meeting, and 30%, and 60% submittals for the lift station and force main project. Prepare and distribute meeting notes within one (1) week of each meeting.

*Deliverables associated with this task include meeting notes from progress meetings.*

- 1.2 Data Collection and Review. Confirm project goals with the City. Collect relevant information on the service area, including land uses and zoning to project future wastewater flows, and available reports and drawings, including electronic base files, on the existing facilities and tributary sewers. Topographic survey information to be provided by the City.

*There is no deliverable associated with this task.*

#### **TASK 2.0 PRELIMINARY DESIGN**

- 2.1 Geotechnical Investigation. Arrange for and provide, through a subcontract, a geotechnical investigation for the design of the lift station and force main. The geotechnical investigation is based upon a total of seven (7) soil borings taken at the proposed lift station site and along the selected force main alignment.

*Deliverables associated with this task include a Geotechnical Report prepared by Patriot*



- 2.2 Wastewater Flows and Lift Station Sizing. Estimate near-term (Auburn Meadows) and buildout wastewater flows (service area tributary to the lift station consistent with Master Plan) to determine lift station design capacity. Determine pump size and potential phasing to accommodate near-term and buildout conditions.

*Deliverables associated with this task include summarizing lift station flows for inclusion in the basis of design memorandum.*

- 2.3 Force Main Route and Sizing. Review up to two force main routes from the lift station to the Kalberer Road sewer and present recommended force main route to the City for approval. Size force main to convey near-term and buildout flows. Conduct hydraulic analyses for the force main to optimize pipe size versus pumping head to select best long-term option.

*Deliverable associated with this task include summarizing force main sizes for inclusion in the basis of design memorandum.*

- 2.4 Electrical. Summarize electrical requirements including the following:

- Define electrical service for new loads
- Size power systems at lift station
- Size new standby generator and transfer switch
- Define electrical lighting design criteria
- Support instrumentation installation with raceways
- Prepare preliminary one-line diagram for proposed lift station

*Deliverables associated with this task include preparation of the electrical design criteria for inclusion in the basis of design memorandum.*

- 2.5 Instrumentation and Controls. Summarize instrumentation and control requirements including remote monitoring needs and flow measurement. These include the following:

- Monitor pump status
- Monitor pump and motor temperature, leakage, etc.
- Monitor and control lift station alarm levels
- Monitor generator status
- Real-time flow measurement
- Telecommunications improvements for remote monitoring via the City's Supervisory Control and Data Acquisition (SCADA) System at the WRRF.

*Deliverables associated with this task include preparation of the instrumentation and control design criteria for inclusion in the basis of design memorandum.*

- 2.6 Preliminary Cost Opinion. Prepare a preliminary construction cost opinion for the project at 30 percent design.

*Deliverables associated with this task include preparation of a construction cost opinion.*

- 2.7 Basis of Design Memorandum. Prepare a basis of design memorandum to summarize the general design criteria for lift station and force main improvements. The memorandum will summarize: site location and accessibility; number, size and type of easements required; number and capacity of pumps; force main size; electrical, and instrumentation and control requirements; and a preliminary construction cost opinion.

*Deliverables associated with this task include preparation of basis of design memorandum at 30 percent design.*

### **TASK 3.0 DESIGN**

- 3.1 Drawings. Prepare Drawings for use, together with the Specifications, for soliciting a Guaranteed Maximum Price (GMP) proposal for a single construction contract.

*Deliverables associated with this task include 60 percent and 90 percent Drawings for review and comment and Final Contract Drawings.*

- 3.2 Specifications. Prepare Specifications for use, together with the Drawings, for soliciting a Guaranteed Maximum Price (GMP) proposal for a single construction contract. Engineers Joint Contract Documents Committee (EJCDC) General Conditions will be used. Standard Construction Specifications Institute (CSI) 16-section format will be used.

*Deliverables associated with this task include a 60 percent and 90 percent Specifications for review and comment and Final Specifications as described above.*

- 3.3 60 Percent Cost Opinion. Prepare a construction cost opinion for the project at 60 percent design.

*Deliverables associated with this task include a 60 construction cost opinion prior to receiving Contractor's GMP.*

- 3.4 Easement Requirements. Determine the number, size and type of easements that will be required for the project. Easement acquisition is not included in the scope of services.

*There is no deliverable associated with this task.*

- 3.5 Permit Assistance. Prepare project information submissions, including permit applications and review comments, to the following agencies:

- Indiana Department of Environmental Management (IDEM)
- Indiana Department of Natural Resources (IDNR)

All plan review and permitting fees will be paid by the City.



*Deliverables associated with this task include preparing and submitting permit applications to IDEM and INDR and responding to comments until approval is received.*

- 3.6 Erosion & Sediment Control Plan. Prepare Erosion and Sediment Control Plan in accordance with IDEM Rule 5 and the Tippecanoe County Soil and Water Conservation District (SWCD). Incorporate any Tippecanoe County SWCD review comments into the 60 percent drawings.

*Deliverables associated with this task include preparing an approvable Erosion & Sediment Control Plan to the Tippecanoe County SWCD.*

#### **TASK 4.0 GMAX PRICING PHASE**

- 4.1 GMP Proposal Inquiries. Respond to Proposer inquiries during the GMP pricing phase.

*Deliverables associated with this task include responding to Proposer inquiries.*

- 4.2 Addenda. Prepare addenda as needed to clarify the Contract Documents.

*Deliverables associated with this task include preparing and distributing addenda to Contract Documents as needed.*

#### **TASK 5.0 CONSTRUCTION ADMINISTRATION**

- 5.1 Submittals. Review up to 25 shop drawings, product submittals, equipment manufacturer's operation, lubrication, and maintenance manuals for compliance with the design intent as expressed in the Contract Documents.

*Deliverables include one set of approved submittals at completion of the project.*

- 5.2 Progress Meetings. Qualified representatives of the Engineer shall visit the site twice a month during construction progress meetings. Weekly construction conference calls will be held during the other 2 weeks of the month. The construction period is estimated to be 8 months. For purposes of estimating level effort, there will be 14 on-site progress meetings and 18 conference calls. Any comments and observations regarding the construction work shall be given to the Resident Project Representative and OWNER.

- 5.3 RFI/Clarifications. Respond to Contractor's request for interpretation and clarification for up to fifteen (15) RFI/Cs.

- 5.4 Supplementary Drawings. Prepare up to five (5) supplementary detailed drawings and specifications as needed for clarification of the Contract Drawings. Design changes are excluded from the scope of this task and will be provided upon separate authorization by OWNER.

- 5.5 Value Engineering. Review up to three (3) Contractor value engineering items and provide recommendations to the OWNER.



5.6 General Administration. Respond to inquiries from the Resident Project Representative, Contractor and OWNER relative to interpretation of the drawings and specifications, project schedule, pay applications, change orders and other matters concerning construction.

Collaborate with Contractor in review of cost savings measures identified during period of construction. Provide recommendation to OWNER regarding implementation of cost savings measure.

5.7 Start-up Assistance. Assist in the initial field check and start-up of the Project.

5.8 Record Drawings. Revise the original contract drawings to reference changes reported to the Resident Project Representative during construction. These record drawings shall incorporate changes shown on the Contractor's and the Resident Project Representative's record sets of drawings, supplementary drawings, shop drawings, and other records of field changes. Provide the OWNER with record drawings consisting of two full-size printed sets and two copies of electronic AutoCAD files.

City of West Lafayette, Indiana

Auburn Meadows Lift Station and Force Main

**Preliminary List of Drawings**

**General**

1	G01	Index, Location Map, Abbreviations and General Notes
2	G02	Existing Site Plan
3	G03	New Site Plan
4	G04	Sedimentation and Erosion Control Plan
5	G05	Sedimentation and Erosion Control Plan and Details

**Civil – Force Main**

6	C01	Plan and Profile
7	C02	Plan and Profile
8	C03	Plan and Profile
9	C04	Plan and Profile
10	C05	Plan and Profile
11	C06	Plan and Profile
12	C07	Plan and Profile
13	C08	Plan and Profile
14	C09	Plan and Profile

**Piping and Equipment – Lift Station**

15	M01	Plan and Section
16	M02	Plan and Section
17	M03	Miscellaneous Details

**Structural**

18	S01	General Notes
19	S02	Plans and Sections

**Electrical**

20	E01	One Line Diagram, Power Plan and Details
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City of West Lafayette, Indiana

Auburn Meadows Lift Station and Force Main

**Preliminary List of Specifications**

**BIDDING REQUIREMENTS**

**SECTION NUMBER**

Notice to Bidders	00100
Instructions to Bidders	00200
Bid Proposal Form	00300
Bid Bond Form	00410

**CONTRACT FORMS**

Agreement Form	00500
Performance Bond Form	00610
Payment Bond Form	00620
Maintenance Bond Form	00650
Notice to Proceed Form	00680

**CONDITIONS OF CONTRACT**

General Conditions	00700
Supplementary Conditions	00800
Wage Rates	Exhibit A

**TECHNICAL SPECIFICATIONS**

**DIVISION 1 – GENERAL REQUIREMENTS**

Summary of Work	01110
Change Order and Work Order Procedures	01250
Payments	01290
Contract Items	01291
Coordination and Meetings	01310
Progress Schedule	01325
Submittals	01330
Quality Control	01450
Construction Facilities and Temporary Controls	01500
Material and Equipment	01600
Lines and Grades	01722
Cutting and Patching	01732
Cleaning	01740
Operation and Maintenance	01783
Contract Close Out	01789
Training	01820



## **DIVISION 2 – SITEWORK**

Site Clearing	02230
Shoring, Sheeting and Bracing	02251
Earth Excavation	02316
Backfilling	02317
Jacking, Augering and Mining	02445
Slope Protection and Erosion Control	02370
Laying and Jointing Buried Pipelines	02500
Buried Ductile Iron Pipe and Fittings	02505
Buried Polyvinyl Chloride (PVC) Pipe and Fittings	02507
Leakage Tests	02516
Chain Link Fencing and Gate	02762
Landscaping Work	02900

## **DIVISION 3 – CONCRETE**

Concrete Formwork	03100
Concrete Accessories	03150
Concrete Reinforcement	03200
Cast-In-Place Concrete	03310
Grout	03600

## **DIVISION 4 – MASONRY**

NOT USED

## **DIVISION 5 – METALS**

NOT USED

## **DIVISION 6 – WOOD AND PLASTICS**

NOT USED

## **DIVISION 7 – THERMAL AND MOISTURE PROTECTION**

NOT USED

## **DIVISION 8 – DOORS AND WINDOWS**

Access Doors	08310
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## **DIVISION 9 – FINISHES**

Painting	09900
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## **DIVISION 10 – SPECIALTIES**

NOT USED

**DIVISION 11 – EQUIPMENT**

Submersible Pumping Equipment 11210

**DIVISION 12 – FURNISHINGS**

NOT USED

**DIVISION 13 – SPECIAL CONSTRUCTION**

NOT USED

**DIVISION 14 – CONVEYING SYSTEMS**

NOT USED

**DIVISION 15 – MECHANICAL**

Supports and Anchors	15060
Ductile Iron Pipe and Fittings	15106
Erecting and Jointing Interior Piping	15109
Valves	15110
Pressure Gauges	15124
Natural Gas Systems	15190

**DIVISION 16 – ELECTRICAL**

Basic Electrical Material and Methods	16050
Electrical Requirements for Shop Assembled Equipment	16055
Grounding	16060
Electrical Identification	16075
Electrical Testing Requirements	16080
Wire and Cables – 600 Volts and Below	16121
Electrical Raceway Systems	16130
Underground Electrical Distribution System	16132
Electric Utility Coordination and Requirements	16210
Electric Motors	16220
Packaged Engine Generator Systems	16230
Disconnect Switches	16411
Automatic Transfer Switches	16415
Panelboards	16443

**EXHIBIT B**

**AGREEMENT FOR PROFESSIONAL SERVICES**

between  
CITY OF WEST LAFAYETTE  
and  
GREELEY AND HANSEN LLC

**Estimated Compensation**

		<u>Workhours</u>		<u>Rate</u>	<u>Costs</u>
1. Direct Labor:					
a. Project Manager		302	x	\$175	\$52,850
b. MEPIC		222	x	\$170	\$37,740
c. Project Engineer		628	x	\$110	\$69,080
d. Designer / CAD Operator		232	x	\$100	\$23,200
e. Word Processor		<u>44</u>	x	\$50	<u>\$2,200</u>
	Subtotal	1428			<b>\$185,070</b>
2. Subconsultant Costs					
a. Geotechnical Investigation - Patriot Engineering and Environmental, Inc.					<b>\$11,000</b>
3. Other Direct Costs					
a. Travel <sup>(1)</sup>	1,430 Miles	@	\$0.540 / day	\$772	
b. Reproduction/Printing				<u>\$158</u>	
	Subtotal				<b>\$930</b>
4. Total Compensation					<b>\$197,000</b>

<sup>(1)</sup> Based on 11 trips at 130 miles per trip.